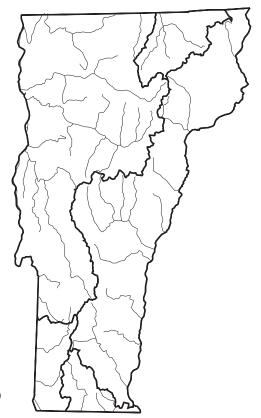
### **Vermont**



 Basin Boundaries (USGS 6-Digit Hydrologic Unit)

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#### **Surface Water Quality**

Of the 5,261 miles of surveyed rivers and streams, over 79% fully support aquatic life uses, 16% partially support these uses, and 5% do not support aquatic life uses. Over 10% of the surveyed rivers and streams do not fully support swimming. The most widespread impacts include siltation, thermal modifications, organic enrichment and low dissolved oxygen, nutrients, pathogens, and other habitat alterations. The principal sources of impacts are agricultural runoff, streambank destabilization and erosion, removal of streamside vegetation, upstream

impoundments, flow regulation, and land development.

Sixty-five percent of the surveyed lake acres (excluding Lake Champlain) fully support aquatic life uses, 26% partially support these uses, and 9% do not support aquatic life uses. The most common problems in lakes include fluctuating water levels, nutrient enrichment, algal blooms, organic enrichment, siltation, and aquatic weeds. Although ranking sixth among current impairments, nonnative species infestations, primarily Eurasian water milfoil, are perhaps the fastest growing cause of lake impairment. Runoff from agricultural lands, roads, and streambank erosion are the most frequently identified sources of lake problems.

In July 1995, a fish consumption advisory was issued on all Vermont waters containing walleye or lake trout due to mercury and PCB contamination, respectively. However, there is an interim fish consumption advisory for all fish due to possible mercury contamination.

### **Ground Water Quality**

The quality of Vermont's ground waters is not well understood due to a lack of resources required to gather and assess ground water data. Ground water contamination has been detected at hazardous waste sites. Other sources of concern include failing septic systems, old solid waste disposal sites, agriculture, road salt, leaking underground storage tanks, and landfills. The State needs to implement a Comprehensive Ground Water

Protection Program, but lacks the financial and technical resources to do so.

# Programs to Restore Water Quality

The recent water quality improvements have not been as dramatic as in earlier years due to completion of the wastewater treatment facilities on the more heavily polluted rivers. This is because the State is focusing on the reduction of nonpoint sources of pollution. Water quality certifications were issued for seven hydroelectric facilities, which could result in the improvement of 42 miles of rivers and 4,350 acres of lakes through minimum flow requirements.

# Programs to Assess Water Quality

Vermont's monitoring activities balance short-term intensive and long-term trend monitoring. Notable monitoring activities include fixed-station monitoring on lakes and ponds, citizen monitoring, long-term acid rain lake monitoring, compliance monitoring for permitted dischargers, toxic discharge monitoring, fish contamination monitoring, and ambient biomonitoring of aquatic insects and fish.

- Not reported in a quantifiable format or unknown.
- <sup>a</sup> A subset of Vermont's designated uses appear in this figure. Refer to the State's 305(b) report for a full description of the State's uses.
- b Includes perennial streams only.
- <sup>c</sup>Excluding Lake Champlain.

#### **Individual Use Support in Vermont**

